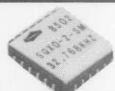




Surface Mountable Crystal Oscillators

Preliminary Data Sheet

1 Hz to 32 MHz



Actual size

Features

Standard 24-pin ceramic leadless chip carrier

Designed for surface mounting using vapor phase solder reflow or wave solder

TTL and CMOS compatible

Low power consumption

High shock resistance

Military testing available

Description

Statek surface-mountable crystal oscillators consist of a CMOS-compatible hybrid circuit and a miniature quartz crystal in a standard 24-pin ceramic leadless chip carrier. They are compatible with conventional vapor phase solder reflow and wave solder processing techniques and offer small size, low power consumption, high shock resistance and excellent long-term stability.

Model SQXO-2-SM: 10 kHz to 32 MHz

Model DQXO-3-SM: 1 Hz to 10kHz

Specifications

Specifications are typical at 25°C unless otherwise noted. Specifications are subject to change without notice.

Calibration tolerance A: $\pm 0.01\%$
B: $\pm 0.03\%$

Temperature coefficient -0.035 (ppm/°C²)

Supply voltage 4 to 6 V

Frequency range 1 Hz to 2 MHz*

Supply current** 0.5 mA at 10 kHz

2.0 mA at 2 MHz

5.0 mA at 32 MHz

Operating temperature

Industrial -40 to $+85^{\circ}\text{C}$

Military -55 to $+125^{\circ}\text{C}$

Shock

1 Hz to 600 kHz 1000g, 1mS, 1/2 sine

600 kHz to 2 MHz 750g, 1 mS, 1/2 sine

Vibration 10g, 10 to 2000 Hz

Storage temperature -55 to $+125^{\circ}\text{C}$

Aging, first year 10 ppm maximum

Maximum Assembly

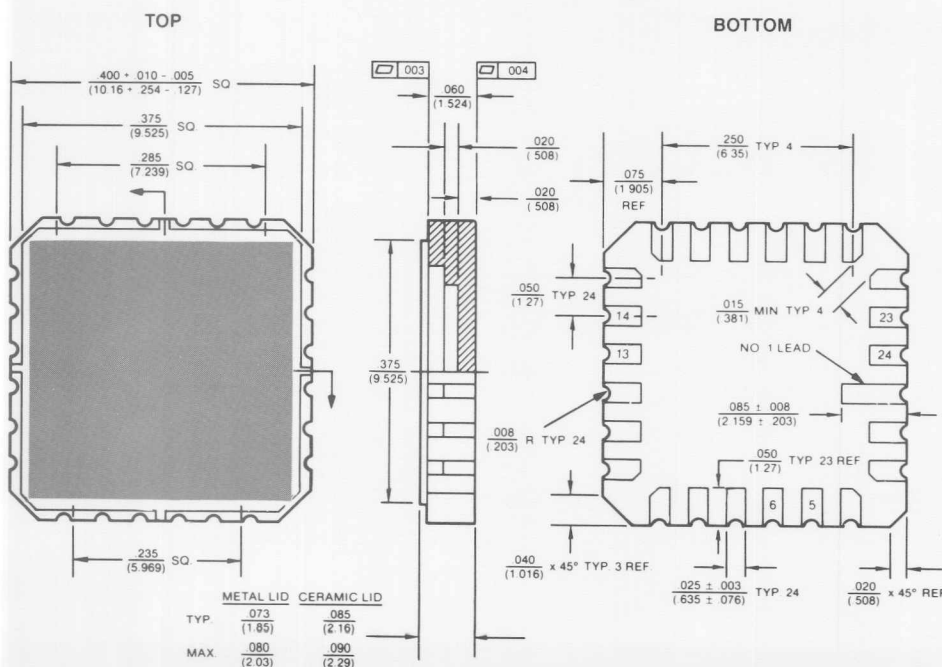
temperature 270°C for 30 sec

*Lower frequencies available. contact factory

**5V supply voltage; 10pf. 10 M Ω load

Dimensions

Inch
(mm)



NOTES:

1. Tolerances $\pm 1\%$ NLT $\pm .005$ (.127) unless otherwise specified.
2. Thickness tolerance $\pm 10\%$ NLT $\pm .003$ (.0076) unless otherwise specified.
3. Ceramic material: AlSiMag* 777 (94% Al₂O₃).
4. Metallizing refractory metal + nickel + gold (60 μ " thk. min.).

PIN CONNECTIONS:

- | | |
|------------|-----------------|
| 23,24 | Ground |
| 5,6 | V _{DD} |
| 13,14 | Output |
| All Others | NC |

NC: not connected, but may be connected internally



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